# EXTRA EXERCISE GAME THEORY 2

**Company ALFA DRINKS and company BETA DRINKS are both producers of soft drinks. Both companies are trying to figure out how much soft drinks is needed to be produced to gain more market share and raise profit.**

**There are two strategies: limit production or increase production.**

**They know the following:**
**If both limit production to the actual level, each company gains $50.000.**

**If ALFA DRINKS increases its production and BETA DRINKS limits its production to the actual level, then ALFA DRINKS will gain $150.000, while BETA DRINKS will gain only $25.000.**
**If ALFA DRINKS limits its production to the actual level and BETA DRINKS increases its production, then ALFA DRINKS will gain only $25.000 and BETA DRINKS will gain $150.000.**
**If both companies increase their production, both companies will gain $75.000.**

1. Complete the result matrix below
2. Determine the best-response strategies for each company
3. Define the dominant strategy for each company (only if applicable)
4. Determine the Nash equilibrium (only if applicable)
5. Analyze the NE: is it Pareto-optimal or not?
(only if applicable)

# STEP 1:

| | | BETA DRINKS | |
|---|---|---|---|
| | | | |
| ALFA DRINKS | | | |
| | | | |

## STEP 2:

## STEP 3:

## STEP 4:

## STEP 5: